Toxic Bite of a Spider, Cheiracanthium Inclusum Hentz

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In California it is generally conceded that Latrodectus mactans (Fabricius), the black widow, is the only spider dangerously venomous to man. The fairly common reports by persons not versed in the subject, of cases of less severe spider bites, in which the arthropod is not available for identification, are usually attributed to the black widow spider or to stings or bites from various insects such as bees, wasps, scorpions or kissing bugs. Hence it is of particular interest to record a decidedly venomous effect from the bite of a common North American spider previously regarded as harmless.

One of the authors (W.C.R.) was wakened at 3:45 a.m. by a sharp penetrating pain below the outer margin of the right eye. Clapping a hand to the site, he felt a lump and suspected a hematoma from a ruptured capillary. Holding his hand in place until he reached a mirror, he found a small spider with the chelicerae so firmly imbedded in the skin that a

slight pull was needed to detach it.

Cold compresses applied to the area of the bite for an hour did not alleviate the pain, nor did taking 2.0 gm. (30 grains) of acetylsalicylic acid over a four-hour period. Within three hours after the bite, throbbing pain had spread over the cheek to the right lower mandibular area. By 10:30 a.m. the pain was still intense but seemed to be abating, and by 4 p.m. it was gone. The skin of the affected area was not painful when touched and there was no inflammation or evidence of proteolytic action. The venom appeared to have only a local neurotoxic effect.

The spider was identified by Dr. Willis J. Gertsch

of the American Museum of Natural History as an immature male of *Cheiracanthium inclusum* Hentz, of the family Clubionidae. It is an inconspicuous, pale yellow spider, less than one quarter of an inch long. In view of its wide occurrence throughout North and South America and its frequent appearance in houses, it is surprising that there are no previous records of its biting man. Subsequently 14 specimens were found in the house where the bite occurred. Apparently they came from shrubbery surrounding the house. It is presumably not a pugnacious species, as a recently acquired active specimen could not be persuaded to bite man when applied to an area of thin skin.

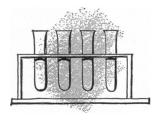
Dr. Gertsch said that the bite of the genus Cheiracanthium has been observed to be not completely inoffensive.¹ The bite of the European Cheiracanthium punctorium (Villers) causes pain comparable to the sting of a wasp, sometimes associated with fever and other symptoms.¹ Similarly spiders of the species Cheiracanthium diversum L. Koch, in the Hawaiian Islands, have bitten a number of persons, causing moderate to grave symptoms.¹

Human sensitivity to arthropod venom varies greatly among individuals. For example the bite of *Triatoma protracta* (Uhler), a blood-sucking reduviid bug, may produce systemic, prostrating effects in some persons and no observable symptoms in others. Some persons are probably similarly hypersensitive to the venom of spiders such as *Cheiracanthium inclusum*, and the effect reported here may fall in this category. The alarming and excruciatingly painful reaction indicates that closer scrutiny should be given to other reports of spider-bite injury. The fact that the black widow appears to be the only dangerously venomous spider in California does not preclude the probability that the bites of other spiders may cause considerable injury.

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REFERENCE

1. Gertsch, W. J.: Personal communication, 1957.



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